Sciences

Biology

Dr. Punya Nachappa

My research is focused on understanding how insect pests and disease impact plant growth and yield. I am especially interested in studying insect vectors. An insect vector is an insect that transmits a pathogen or infectious microbe to an animal or plant. I focus on insect vectors such as soybean aphids and thrips that transmit viruses to soybean plants. Why soybean? Indiana is one of the top producers of soybean in the country and the United States ranks number one in soybean production in the world. Therefore, soybean is not only important to the local economy, but to the nation’s economy as well. In my lab, we use a combination of laboratory and greenhouse experiments along with cutting-edge molecular biology tools to study plant-insect vector-pathogen interactions. Hence, you will receive a well-rounded research experience in several fields of biology including entomology, plant pathology, molecular biology and genetics. Please browse my website to learn more about on-going projects that might interest you. Website- http://www.nachappalab.com/